

AMENDMENTS TO THE CLAIMS:

The listing of claims will replace all prior versions, and listings of claims in the application:

LISTING OF CLAIMS:

1-7. (Cancelled)

8. (Currently Amended) A print head for an ink jet printer comprising:
a first passage in communication with an ink source;
a surface having an orifice for delivering ink to an associated print media and/or drum, wherein the orifice communicates with the first passage;
a second passage in communication with the first passage and an associated pressure source; and

a valve member disposed in the first passage upstream from the second passage, wherein the valve member is adapted to move between an open position and a closed position, when in the open position the valve allows ink to travel towards the orifice and when in the closed position the valve inhibits ink from traveling towards the ink source;

a valve seat and a valve stop positioned downstream from the valve seat, wherein the valve member seats on the valve seat when in the closed position and the valve member abuts the valve stop when in the open position;

wherein the valve stop includes a contact surface downstream from and at an acute angle to the valve seat;

wherein the contact surface defines at least one depression to expose a portion of the valve member to pressure from the associated pressure source when the valve member is in a closed position.

9-10. (Cancelled)

11. (Currently Amended) The print head of claim [[10]]8, wherein the acute angle is about 5 degrees.

12. (Cancelled)

13. (Currently Amended) The print head of claim [[9]]8, further comprising a valve moat adjacent a periphery of the valve seat.

14. (Original) The print head of claim 8, further comprising a relief passage defined along the passage adjacent the valve member, wherein the relief passage reduces the resistance of flow of ink around the valve member when in the open position.

15. (Original) The print head of claim 14, wherein the relief passage is positioned above the valve member.

16. (Original) The print head of claim 8, wherein the valve member comprises a substantially vertically disposed plate.

17. (Original) A printer including the print head of claim 8.

18. (Original) A print head for a printing apparatus that uses liquid ink, the print head comprising:

an ink bucket for storing ink received from an associated ink source, the ink bucket in communication with a passage defined in the print head;

a surface defining an orifice for ejecting ink out of the print head, wherein the orifice is in communication with the passage;

means for applying pressure to the passage separate from ink stored in the ink bucket; and

a valve disposed in the passage, wherein the valve opens in response to pressure applied by ink stored in the ink bucket and closes in response to pressure applied by the pressure applying means.

19. (Original) The print head of claim 18, wherein the pressure applying means includes a fitting in communication with an air pressure source.

20. (Original) The print head of claim 18, wherein the valve includes a disc-shaped plate vertically disposed in the passage.

21-22. (Cancelled)

23. (New) The print head of claim 8, further comprising an ink bucket in communication with the first passage.

24. (New) The print head of claim 8, further comprising a fitting in communication with the associated pressure source.